Section 6.4

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1 I / O BUS Nodes Digitizer

1.1 Codings of the Stepper Motor Control Boards (EPROM version)

IOB-SIN-STEP CM+8.9499.8080.3

Do not connect the lightbarrier to plug ST8 of the control board. (is only for diagnostics!)

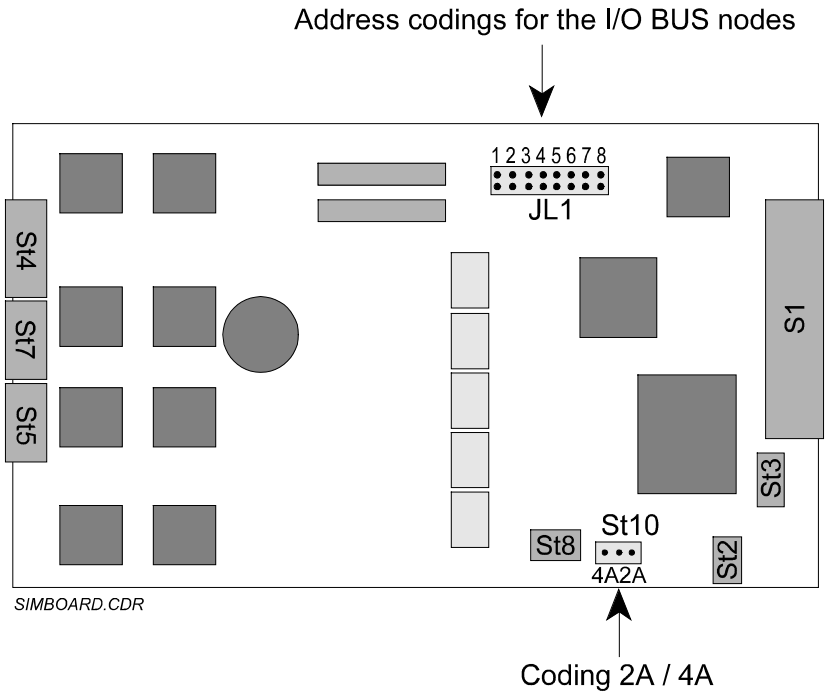


Figure 1

List of the IO-Bus Nodes

Rotation unit (200):

Designation	2A	4A	IO-Bus Address	ST10 2A 4A	JL 1 2 3 4 5 6 7 8
GS202-ROTATION-BD	X		2C Hex	o--o o	: : I I : I : :

Scanner (500):

Designation	2A	4A	IO-Bus Address	ST10 2A 4A	JL 1 2 3 4 5 6 7 8
GS522-SCAN-ROLLS-LIFT	X		37 Hex	o--o o	I I I : I I : :
GS524-POSTSC-ALIGN-BD	X		38 Hex	o--o o	: : :I I I : :
GS526-PRESC-ALIGN-BD	X		35 Hex	o--o o	I : I : I I : :
GS528-SLOWSCAN-BD	X		36 Hex	o--o o	: I I : I I : :

Output Transport (600):

Designation	2A	4A	IO-Bus Address	ST10 2A 4A	JL 1 2 3 4 5 6 7 8
GS610-POSTSC-SUCT-BD	X		3B Hex	o--o o	I I : I I I : :
GS612-POSTSC-SLED-BD		X	3A Hex	o o--o	: I : I I I : :

Input Transport (650):

Designation	2A	4A	IO-Bus Address	ST10 2A 4A	JL 1 2 3 4 5 6 7 8
GS660-PRE-SUCTION-BD	X		33 Hex	o o--o	I I I : I I : :
GS662-PRESCAN-SLED-BD		X	32 Hex	o o--o	: I I : I I : :

Cassette Unit 1 (700) :

Designation	2A	4A	IO-Bus Address	ST10 2A 4A	JL 1 2 3 4 5 6 7 8
GS702-CASS1-CLAMP-BD	X		23 Hex	o--o o	I I : : : I : :
GS704-CASS1-LIFT-BD	X		22 Hex	o--o o	: I : : : I : :
GS706-CASS1-BELT-BD		X	25 Hex	o..o--o	I : I : : I : :
GS708-CASS1-ROLL-BD	X		21 Hex	o--o o	I : : : : I : :
GS710-CASS1-OPEN-BD	X		24 Hex	o--o o	: : I : : I : :

Cassette Unit 2 (750):

Designation	2A	4A	IO-Bus Address	ST10 2A 4A	JL 1 2 3 4 5 6 7 8
GS752-CASS2- CLAMP-BD	X		27 Hex	o--o o	: : : I : I : :
GS754-CASS2- LIFT-BD	X		28 Hex	o--o o	I I I : : I : :
GS756-CASS2-BELT-BD		X	2A Hex	o o--o	: I : I : I : :
GS758-CASS2-ROLL-BD	X		26 Hex	o--o o	: I I : : I : :
GS760-CASS2-OPEN-BD	X		29 Hex	o--o o	I : : I : I : :

Input Buffer (900, 930):

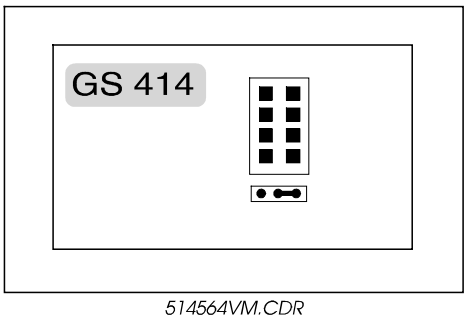
Designation	2A	4A	IO-Bus Address	ST10 2A 4A	JL 1 2 3 4 5 6 7 8
GS910-INBUFF-BELT-BD		X	2E Hex	o o--o	: I I I : I : :
GS932-INBUFF-DOOR-BD	X		2D Hex	o--o o	I : I I : I : :

Output Buffer (950):

Designation	2A	4A	IO-Bus Address	ST10 2A 4A	JL 1 2 3 4 5 6 7 8
GS952-OUTBUF-PUSH-BD		X	30 Hex	o o--o	: : : : I I : :
GS956-OUTBUFF-ROLL-BD		X	2F Hex	o o--o	I I I I : I : :

1.2 Codings of the other I/O BUS Nodes

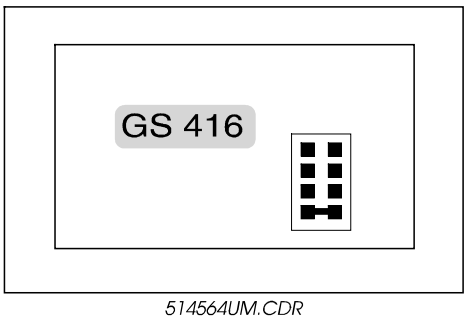
GS414-VAC-DRIVER-NODE (controls the vacuum pump and the magnetic valves)



CM+9.9499.6260.4
I/O BUS address: 70 Hex

Figure 2

GS 416-ERASE-DRV-NODE (controls the erasure lamp)



CM+9.5145.1735.1
I/O BUS address: 71 Hex

Figure 3

2 Ethernet Board Digitizer

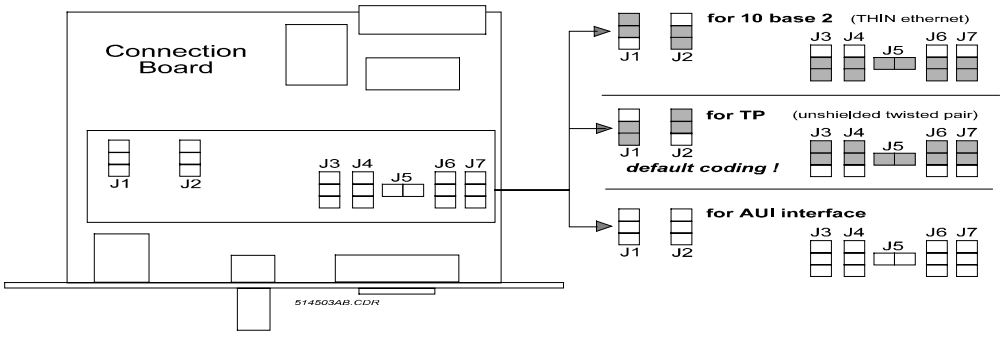


Figure 4

3 VME Boards Digitizer

3.1 Gemini Board

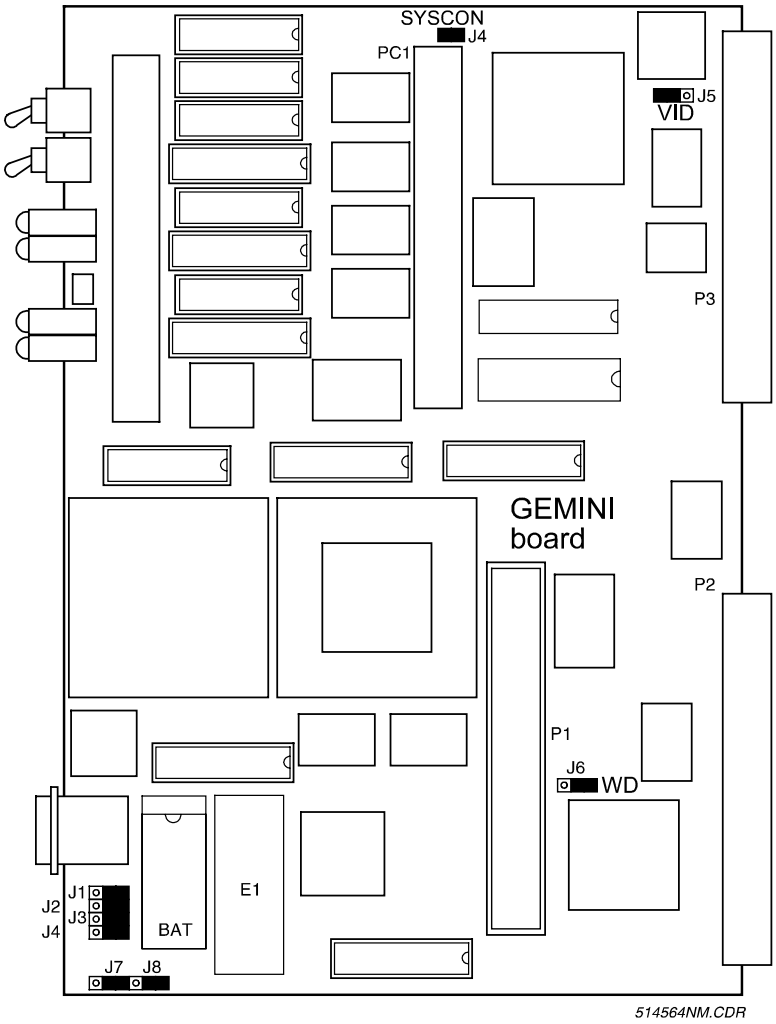


Figure 5

3.2 BER - Board

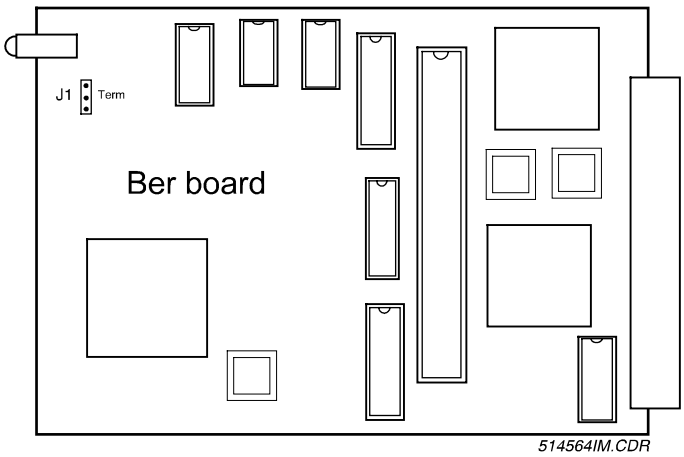
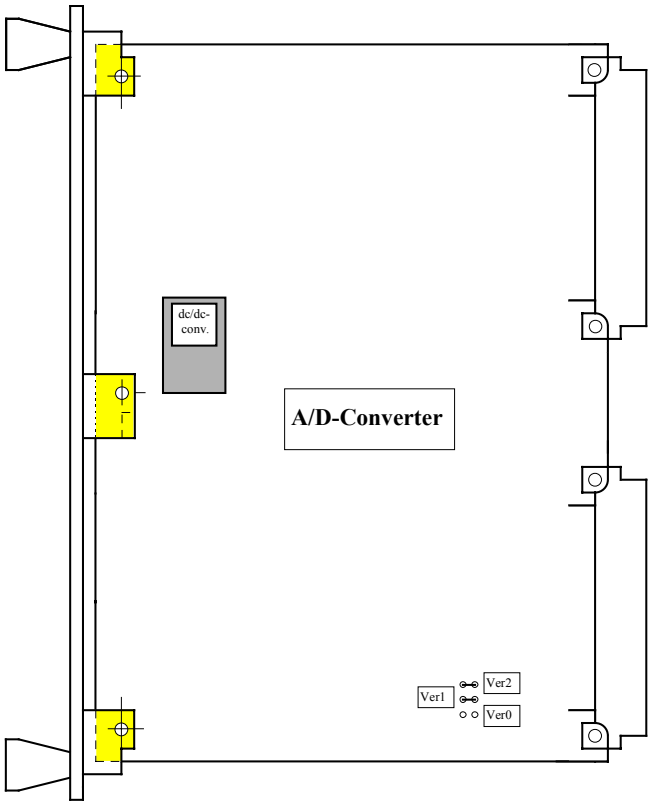


Figure 6

3.3 SAB - Board (Scan Acquisition Board)

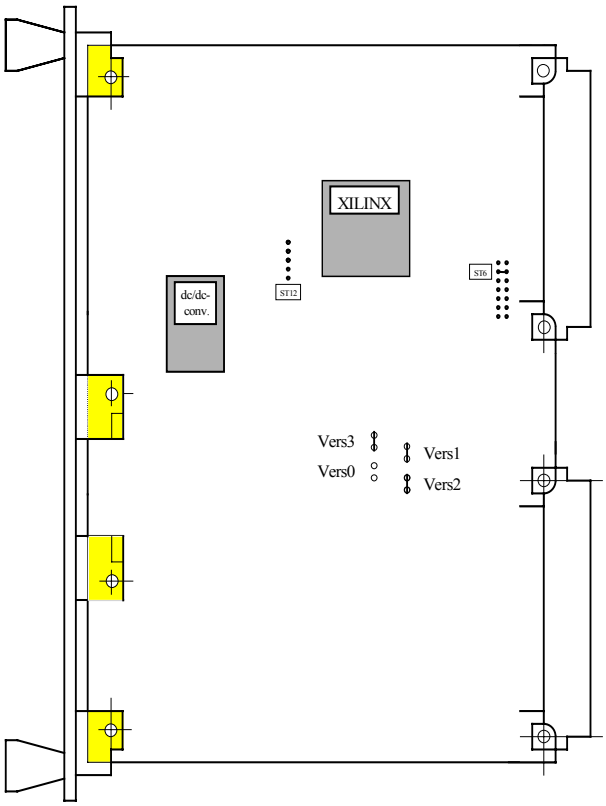


Function of the jumpers:

Only the bridges VER1 and VER2 have to be set to get the version number 1.

Figure 7

3.4 SCB - Board (Scan Control Board)



Functions of the jumpers:

ST6: connects the interrupt generated on the board to VME interrupt line IRQ6 and has to be closed as shown in the drawing

ST12: This jumper row is forseen for boundary scan connection, for testing of the FPGA. In normal operation mode this jumper row is not connected.

Figure 8

4 Jumper Configuration of the VME-Hard Disk

4.1 Necessary Basic Settings of the ADC-SCSI-Hard Disk

Please check the following settings before installing the SCSI-hard disk.
These settings are explicitly valid for all SCSI-hard disks used in ADC Compact.

Destination	Setting
SCSI-ID:	Disabled (Address = 0)
Terminator:	Enabled
Autospin:	Enabled
Parity:	Enabled

4.2 Table of Hard Disks currently used in ADC Compact

Up to now two equally designed SCSI hard disks are being used in ADC COMPACT. They only differ in the configuration of their jumper settings.

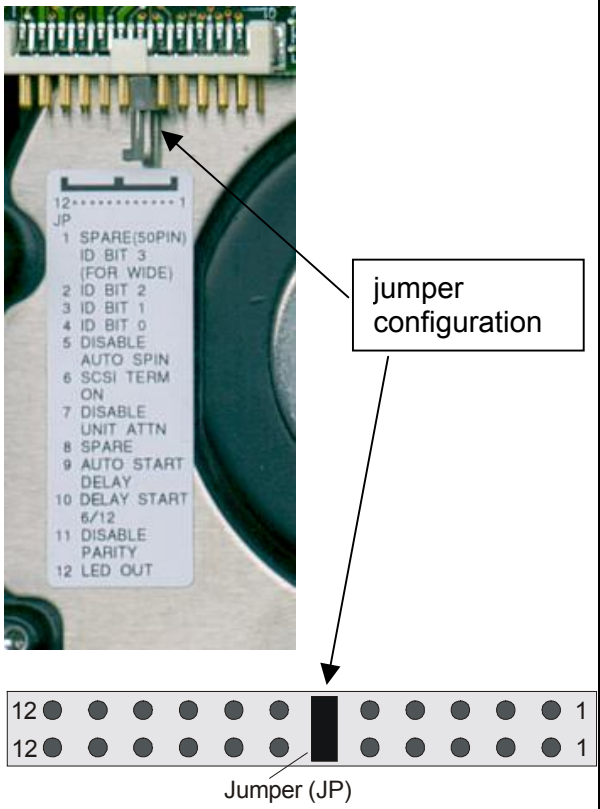
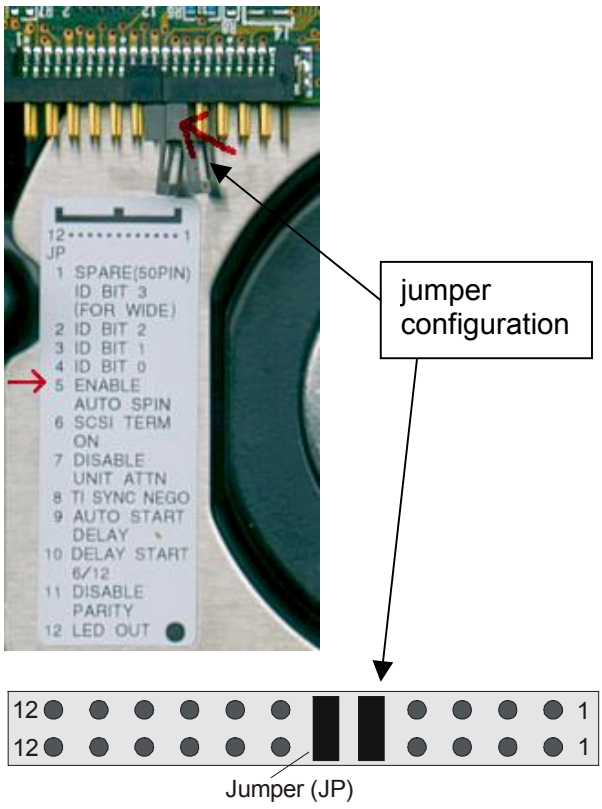
a) SCSI-hard disk F7.0486.1260.x (old version)	b) SCSI-hard disk F7.0486.1260.x (new version)
correct jumper configuration.	**correct jumper configuration**
	
Jumper JP5 set	Jumper JP 5, JP 6 set

Figure 9

Removal and installation of the SCSI-hard disk see section 6.5 “Repair and Service”.

5 ADC Compact: Fuses Overview

Location	Board	Fuse	Quality	protects
Power Unit (400)	GS410 Line Power Con. Board	SI 1	T1,25A	M4 Vacuum Pump
		SI 2	T2,5A	400TR1 Transformator
		SI 3	T500mA	100MC2 Laser Power Supply
		SI 4	T2A	300MC1 VME Power Supply
		SI 5	T6,25A	GS420 15/24V Power Supply
		SI 6	T6,25A	GS420 15/24V Power Supply
	GS412 SM-Fuse Board	SI 1	T6.25A	Cassette Unit 1/2
		SI 2	T6.25A	Cassette Unit 1/2
		SI 3	T3.2A	GS910 Input Buffer Belt
		SI 4	T3.2A	GS932 Input Buffer Door
		SI 5	T3.2A	GS956 Output Buffer Rollers
		SI 6	T3.2A	GS952 Output Buffer Push
		SI 7	T3.2A	GS610/612 IP-Transport left
		SI 8	T3.2A	GS610/612 IP-Transport left
		SI 9	T3.2A	GS660/662 IP-Transport right
		SI 10	T3.2A	GS660/662 IP-Transport right
		SI 11	T3.2A	GS528 Slowscan Board
		SI 12	T3.2A	GS526 Prescan Alignment Board
		SI 13	T3.2A	GS524 Postscan Alignment Board
		SI 14	T3.2A	GS522 Scan Rollers Lift
		SI 15	T3.2A	GS202 Rotation Board
Cassette Unit 1 (700)	GS712 CASS1 Fuse Board	SI 1	T3.2A	GS702 Cass1 Clamp
		SI 2	T3.2A	GS704 Cass1 Lift
		SI 3	T3.2A	GS706 Cass1 Belt
		SI 4	T3.2A	GS708 Cass1 Rollers
		SI 5	T3.2A	GS710 Cass1 Open
Cassette Unit 2 (750)	GS702 CASS2 Fuse Board	SI 1	T3.2A	GS752 Cass2 Clamp
		SI 2	T3.2A	GS754 Cass2 Lift
		SI 3	T3.2A	GS756 Cass2 Belt
		SI 4	T3.2A	GS758 Cass2 Rollers
		SI 5	T3.2A	GS760 Cass2 Open
VME – Rack (300)	VME Adapter Board	SI 1	T3,2A	I/O BUS

All fuses are slowblow fuses.